

## Claims

1. A lube base oil other than silicone oil having a kinematic viscosity of 12 mm<sup>2</sup>/s or below at 40°C, exhibiting, in Noack test (250°C, 1 hr), an evaporation loss of 30 mass% or below and/or a flash point of 200°C or higher, and exhibiting an aniline point of 60°C or higher.

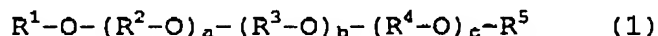
2. A lube base oil as described in claim 1, which exhibits an aniline point of 80°C or higher.

3. A lube base oil as described in claim 1, which exhibits a flash point of 220°C or higher.

4. A lube base oil as described in claim 1, which has a kinematic viscosity of 10 mm<sup>2</sup>/s or below at 40°C.

5. A lube base oil as described in claim 1, which contains an ether compound.

6. A lube base oil as described in claim 5, wherein the ether compound is any of the compounds represented by the following formula, or a mixture thereof:



(wherein R<sup>1</sup> and R<sup>5</sup> each independently represents hydrogen atom, an alkyl group having 1 to 24 carbon atoms, a phenyl group, or an alkylaryl group having 7 to 24 carbon atoms; R<sup>2</sup>, R<sup>3</sup>, and R<sup>4</sup> each independently represents an alkylene group having 2 to 18 carbon atoms; each of a, b, and c is 0 to 8 (preferably 0 to 5) as an averaged value; the sum of a to c is 0 to 8 (preferably 0 to 5); and the units (R<sup>2</sup>-O), (R<sup>3</sup>-O), and (R<sup>4</sup>-O) may be identical to or different from one

another.)

7. A lube base oil as described in claim 1, which further contains a hydrocarbon compound.

8. A lube base oil as described in claim 7, wherein the hydrocarbon compound is a poly( $\alpha$ -olefin).

9. A lubricating oil composition comprising a lube base oil as recited in any of claims 1 to 8, mixed with at least one additive selected from the group consisting of an antioxidant, a viscosity index improver, a detergent dispersant, a friction reducing agent, a metal inactivator, a pour point depressant, an abrasion resisting agent, a defoamer, and an extreme-pressure additive.